

Arizona Mathematics Standard Performance Level Descriptors

Grade 6

Exceeds the Standard – Students who score in this level illustrate a superior academic performance as evidenced by achievement that is substantially beyond the goal for all students. Students who perform at this level demonstrate a wealth of knowledge, skills, and abilities in fulfillment of the math standard. They can add and subtract mixed numbers with unlike denominators, apply formulas to find area and perimeter of complex polygons, and determine the information needed to solve word problems.

Meets the Standard – Students who score in this level demonstrate a solid academic performance on subject matter as reflected by the math standard. Students who perform at this level are able to convert simple decimals into fractions, compare and order whole numbers, mixed numbers, fractions, and decimals, and evaluate expressions that represent word problems. They can use protractors to measure angles, apply properties of circles, and determine shortest routes on a vertex-edge graph.

Approaches the Standard – Students who score in this level show partial understanding of the knowledge and application of the skills that are fundamental for proficient work. Students who perform at this level show some understanding of the math standard's concepts and procedures by multiplying fractions with unlike denominators, rounding decimals to the nearest whole number, identifying greatest common factors, and expressing the results of probability experiments as fractions and decimals. Some gaps in knowledge and skills are evident and may require additional instruction and remediation in order to achieve a satisfactory level of understanding.

Falls Far Below the Standard – Students who score in this level may have significant gaps and limited knowledge and skills that are necessary to satisfactorily meet the state's math standard. Students will usually require a considerable amount of additional instruction and remediation in order to achieve a satisfactory level of understanding.

Students at the “Exceeds the Standard” level generally know the skills required at the “Meets” and “Approaches” levels and are able to:	Students at the “Meets the Standard” level generally know the skills required at the “Approaches” level and are able to:	Students at the “Approaches the Standard” level generally know and are able to:
<ul style="list-style-type: none"> Estimate the area of quadrilaterals. Apply the properties of operations to equations. Divide fractions with unlike denominators. Add and subtract mixed numbers with unlike denominators. Determine all possible combinations and arrangements of items from data displays and word problems. Represent function tables using equations with two variables. Extend patterns beyond the next term. Interpret data displays. Apply formulas to find area and perimeter of complex polygons. Identify parallel lines. Determine elapsed time. Plot and connect points on a coordinate grid and identify the resulting shape. Perform calculations using algorithms. Determine the information needed to solve word problems. 	<ul style="list-style-type: none"> Convert simple decimals into fractions. Compare and order whole numbers, mixed numbers, fractions, and decimals. Find the shortest route between two vertices (points) on a vertex-edge graph. Interpret data displays. Identify and evaluate expressions that represent word problems. Use protractors to measure angles. Apply properties of circles. Solve logic problems involving order. 	<ul style="list-style-type: none"> Apply order of operations to simplify expressions. Multiply fractions with unlike denominators. Round decimals to the nearest whole number. Identify greatest common factors. Interpret data displays. Use estimation strategies to solve word problems. Determine the most reasonable outcome of a probability experiment. Express the results of probability experiments as fractions and decimals. Identify the rules use to create and extend patterns and functions. Solve simple equations with one variable. Recognize common geometric solids. Identify transformations and tessellations of geometric shapes. Classify triangles. Estimate linear measurements to the nearest ¼-inch. Use properties to describe geometric shapes and solids. Find and compare the perimeters of polygons. Use conversion tables or keys to convert standard measurements.

These descriptors do not include all the skills and knowledge as contained in the Math Standard.